



National Park Service U.S. Department of Interior

Valley Forge National Historical Park King of Prussia, PA

Valley Forge National Historical Park

White-tailed Deer Management Plan



**Environmental Impact Statement** 

**Public Scoping Meetings** 

### You're Invited!

Scoping Meetings for the White-tailed Deer Management Plan at Valley Forge National Historical Park

The National Park Service (NPS) has begun preparation of the White-tailed Deer Management Plan and Environmental Impact Statement (EIS) for Valley Forge National Historical Park. Through this planning process, the NPS will analyze potential alternatives for deer management and select one for implementation. An informed, scientifically-based approach to deer management would maintain a white-tailed deer population within the park while ensuring the natural resources that support the purposes of Valley Forge National Historical Park remain in good condition.

Your participation is vital to our planning process. Scoping provides the public an opportunity to express their views on the issues, context, and management alternatives related to deer management. Two public scoping meetings will be held to solicit input and we hope you will attend.

#### When and Where

Wednesday, November 8th
1:00pm to 4:00pm;
Formal presentations at 1:00pm and 2:30pm
Valley Forge NHP, Education Center

Thursday, November 9th, 2006 6:00pm to 9:00pm Formal presentations at 6:00pm and 7:30pm Tredyffrin Township Building Comments may also be submitted to: Superintendent, Valley Forge NHP 1400 North Outer Line Drive King of Prussia, PA 19406

Comments may be submitted electronically at: http://parkplanning.nps.gov/

Please be sure to include your full name and address with your comments so we may add your name to our mailing list for information on future items in this process. Our practice is to make comments, including names, addresses, phone numbers, etc. of respondents available for public review. If you wish to withhold your name and/or address, you must state this prominently at the beginning of your letter or written response and provide a rationale for withholding this information.

More detailed information is available at www.nps.gov/vafo.

The Education
Center is conveniently located at
the Valley Forge
National Historical
Park Welcome
Center at the
intersection of
Route 23 and
Outer Line Drive.



# Purpose of and Need for Taking Action

The purpose of the White-tailed Deer Management Plan/EIS is to develop a deer management strategy that supports long-term protection, preservation, and restoration of native vegetation and other natural and cultural resources. Action is needed to address:

- An increasing number of deer over the past two decades has resulted in undesireable changes in the species composition, structure, abundance, and distribution of native plant communities and associated wildlife.
- Browsing of tree and shrub seedlings by deer browsing will prevent the ability of native forests to grow and mature.

## Preliminary Management Strategies

(These represent initial alternatives only and revision will occur throughout the scoping period.)

- Existing Management Continued (No-Action Alternative)
- Reproductive Control (Surgical and Chemical)
- Lethal Reduction with Firearms by Specially Trained Professionals
- Lethal Reduction without Firearms by Specially Trained Professionals (Archery and Capture and Euthanasia)
- Fencing of Vegetation Communities

#### A White-tailed Deer Management Plan at Valley Forge National Historical Park

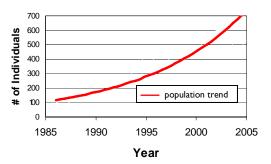
At Valley Forge National Historical Park, landscapes are managed to preserve scenic and historic lands. The result is a mixture of forest and fields, which constitutes excellent habitat for white-tailed deer. This, in combination with loss of deer habitat from urbanized areas surrounding the park, and the absence of hunting and predators, has led to an increasing number of deer over the last two decades. In 1983, the first survey of deer and vegetation reported the presence of between 165 and 185 animals (33-37 deer per square mile). Habitat condition was described as "excellent" with no evidence of a



A mix of forest and fields creates ideal deer habitat.

browse line or other negative impacts of deer on plant communities. By the early 1990s, deer sightings were common place and changes in plant communities were observed. In 2006, park staff estimated the number of deer at Valley Forge to be 1,218 individuals, or 244 deer per square mile.

Since 1992, the park has collected baseline data on deer and vegetation to facilitate a science-based approach to management. The park also initiated several long-term monitoring programs to look at the impact of deer on natural resources and detect trends in deer population size



Deer spotlight count data indicate an increasing trend in deer population size since 1986.

### Park Research and Findings

In 1992, the park began to document the impacts of deer on forest plant communities through evaluation of vegetation in fenced and unfenced monitoring plots. Between 1993 and 1998, the results of this study indicate that fencing allowed a diverse plant community to develop, dominated by native species adapted to specific sites and soil conditions. The number of tree seedlings was significantly greater in fenced vs. unfenced plots. Only one tree seedling  $\geq 10$  inches in height and no seedlings >20 inches in height were present in unfenced plots. Red oak was the species most strongly influenced by fencing, with seedlings occurring only in fenced plots. Data suggest that deer browsing has reduced the number of plant species present in park woodlands to a suite of non-preferred browse species which

in many cases are non-native species. Data were again collected in 2003 and are currently being analyzed.



Within fenced plots, a diverse plant community has developed, dominated by native plant species.



Unfenced plots demonstrate adverse impacts from deer browse.

Between 1997 and 1999, research was conducted to determine white-tailed deer home range and movements relative to the park boundary. Average female annual home range area was 0.38 square miles, relatively small compared to more rural deer populations. Average distance traveled beyond the park boundary was 401 feet.